

DRILL JIGS

bar. When the facing jig is used it can be clamped to the machine table, while the cross-drilling jig is not clamped, because it is necessary to turn it over and over.

Universal Jigs. — While a large percentage of the jigs in common use are designed especially for some part and are used exclusively for that particular part, occasionally jigs are so constructed that they are adjustable and adapted for a variety of work. For this reason they are often called "universal" jigs. Jigs of this type may resemble an ordinary jig somewhat

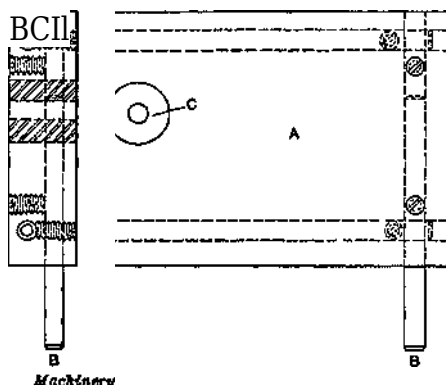


Fig. 25. Toolmakers' Universal Drill Jig

and simply be arranged to locate the guide bushings (in the case of a drill jig) in different positions; or the jig may be in the form of a special attachment for the drilling machine.

An example of universal jig construction is shown in Fig. 25. This is a very simple design and consists of a plate containing one or more drill bushings and adjustable locating rods. It may be used for accurately locating and drilling holes in jigs, dies, and templets. A hardened and ground block *A* is provided with four sliding pins *J*?, a set of removable bushings *C*, and eight headless set-screws. Bushings *C* may be made up with various sized holes to provide for guiding different sizes of drills. Small slugs of brass or copper are used between the set-screws and the pins *B* so that adjusting the screws will not tend to change the position of the pins.